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Title:	The ASD Scorpius Accelerator at the NNSS. Recruitment Slides for the University of Nevada, Reno
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The ASD Scorpius Accelerator at the NNSS.

Recruitment Slides for the University of Nevada, Reno

October, 2020

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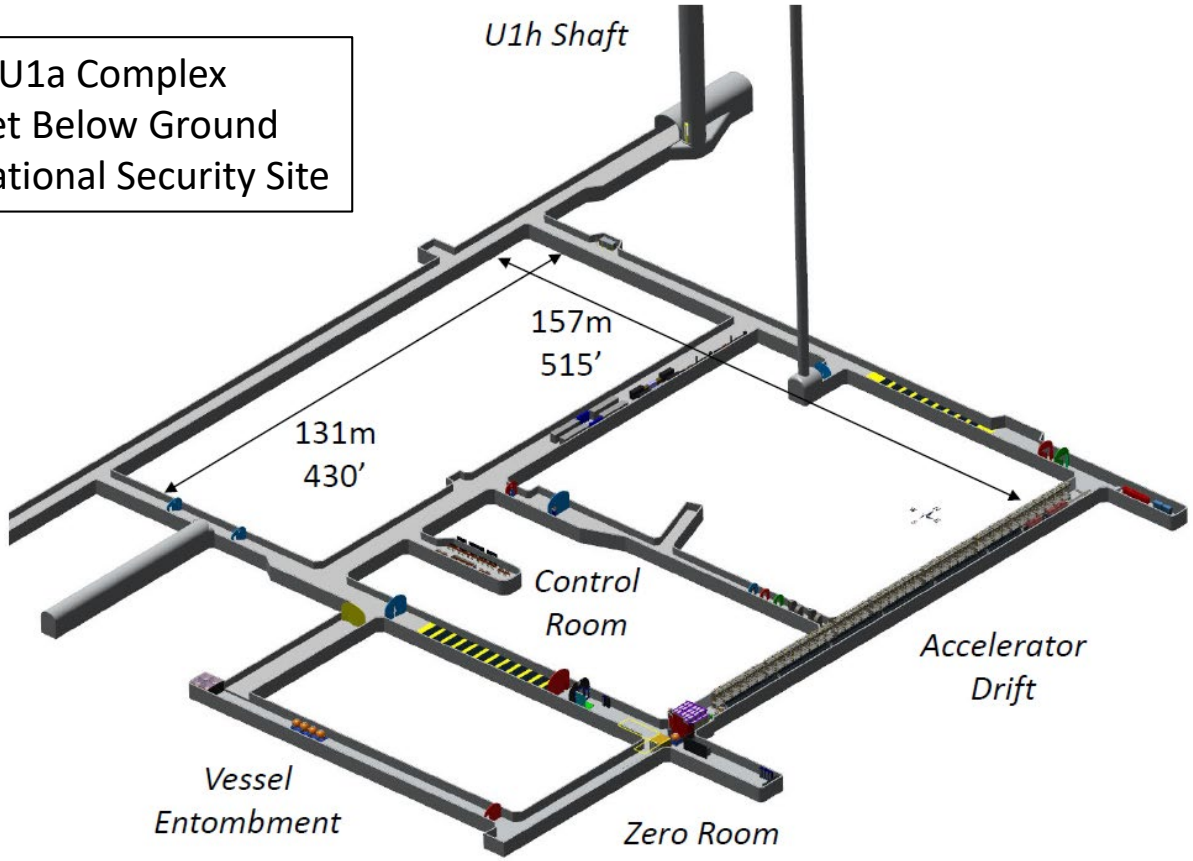
The Scorpius Accelerator:

- Supports the maintenance of the US nuclear stockpile,
- Helps the US not return to nuclear testing,
- Is one of four diagnostics being installed 963 feet below ground,
- Probes subcritical implosions of nuclear material,
- Supports the validation of LANL and LLNL computer codes.

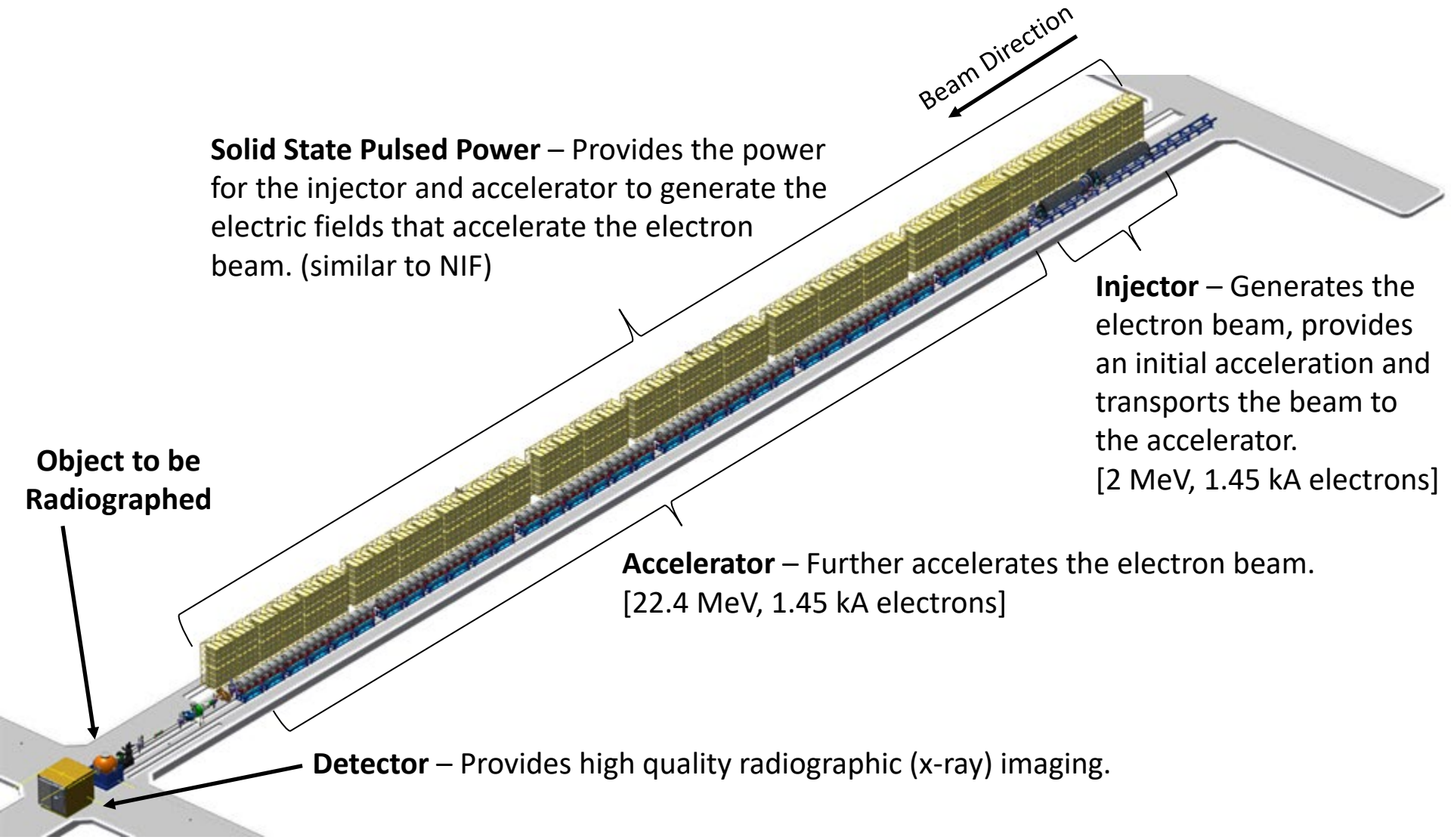
The U1a Complex
963 Feet Below Ground
Nevada National Security Site



ASD Scorpius

NNSA

Commissioning of the Accelerator will begin in 2024.



Solid State Pulsed Power – Provides the power for the injector and accelerator to generate the electric fields that accelerate the electron beam. (similar to NIF)

Injector – Generates the electron beam, provides an initial acceleration and transports the beam to the accelerator.
[2 MeV, 1.45 kA electrons]

Object to be Radiographed

Accelerator – Further accelerates the electron beam.
[22.4 MeV, 1.45 kA electrons]

Detector – Provides high quality radiographic (x-ray) imaging.

ASD Scorpius

NNSA

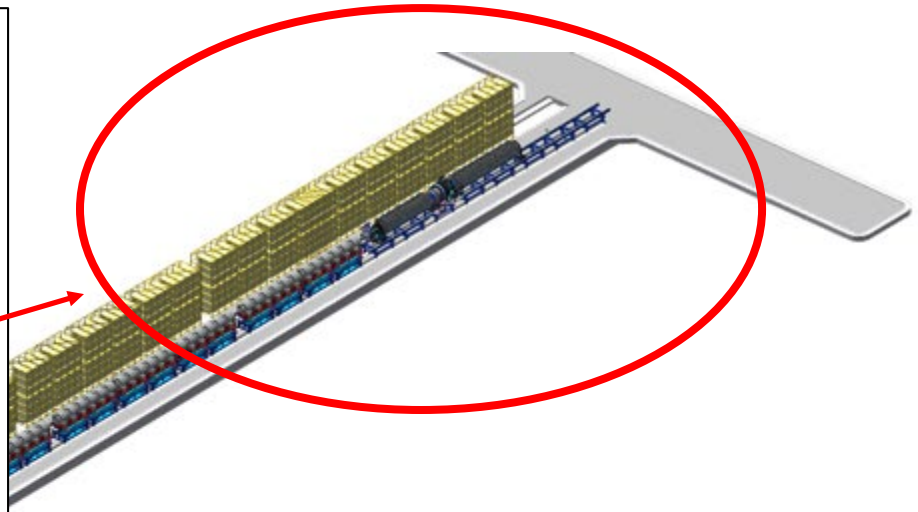
This is a rough timeline of activities.

2020-2021
Technology Maturation Activities
Recruit Engineers, Scientists, Techs, Operators

2022-2023
Install and test the front end of the accelerator at the NNSS Las Vegas Campus.

2023-2024
Install and commission the full accelerator at the Nevada National Security Site.

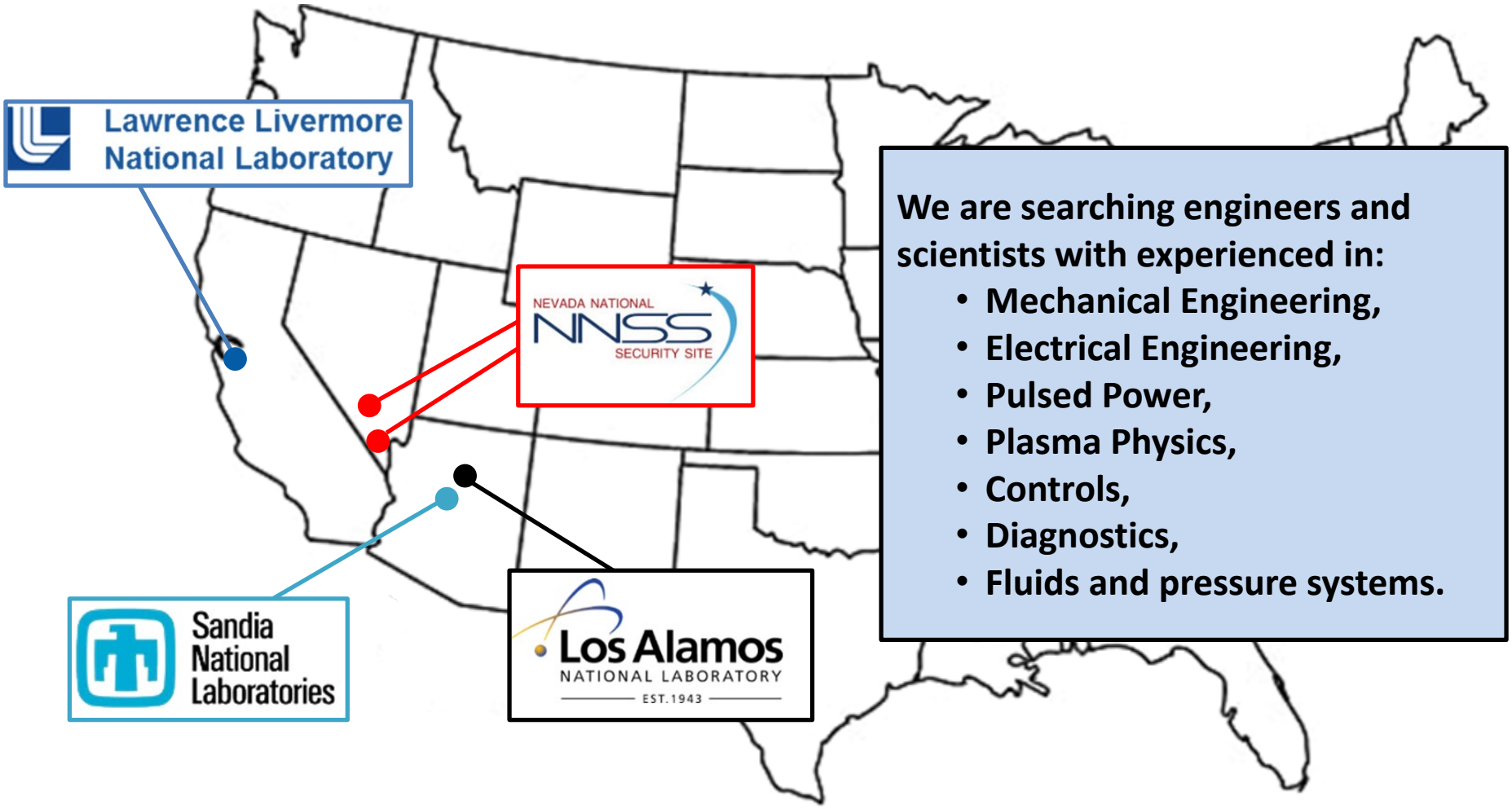
2025
Begin subcritical experiments to support LANL and LLNL.



ASD Scorpius

NNSA

LANL, LLNL, NNSS and SNL are collaborating to design and build Scorpius.

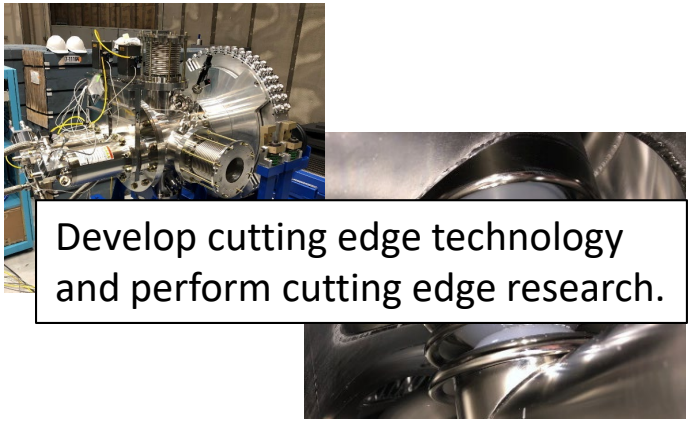


We are searching engineers and scientists with experienced in:

- **Mechanical Engineering,**
- **Electrical Engineering,**
- **Pulsed Power,**
- **Plasma Physics,**
- **Controls,**
- **Diagnostics,**
- **Fluids and pressure systems.**

Have Fulfilling Career.

Closely Collaborate with Partners.



Develop cutting edge technology and perform cutting edge research.

Have Fulfilling Life.

Ski Resorts

Lee Canyon [above]
(Nevada, 45 minutes)

Mt. High & Snow Summit
(California, 3.5 hours)

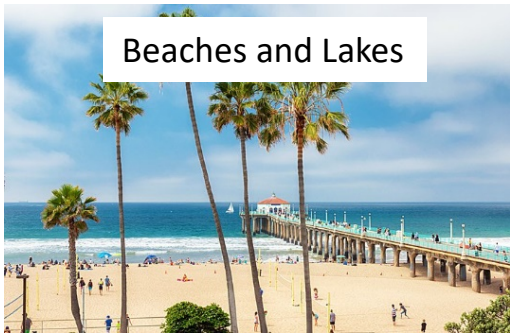
Brian Head & Eagle Point
(Utah, 3.5 hours)

Hiking and Camping

Red Rock Canyon [above]
(Nevada, 30 minutes)

Zion National Park
(Utah, 2.5 hours)

Grand Canyon
(Arizona, 4 hours)



Beaches and Lakes

Los Angeles [above]
(California, 4 hours)

Lake Mead
(Nevada, 40 minutes)

San Diego
(California, 5 hours)

ASD Scorpius

NNSA